

IN THE CLAIMS:

Please amend the claims to read as follows:

1.-60. (Canceled)

61. (NEW) In a patient infected with a virus, a method for detecting an antibody response capable of blocking virus infection comprising:

- a) transfected into a first sample of cells
 - i. nucleic acids encoding envelope proteins of a population of virus infecting the patient, and
 - ii. a viral expression vector which lacks a nucleic acid encoding an envelope protein, and which comprises an indicator nucleic acid which produces a detectable signal,

such that the first sample of cells produces viral particles comprising envelope proteins from the population of virus infecting the patient,
- b) contacting the viral particles of step (a) with an antibody preparation from the patient;
- c) contacting the viral particles and antibody preparation of step (b) with a second sample of cells, wherein the second sample of cells express a cell surface receptor and/or co-receptor which binds to the virus;
- d) measuring the amount of detectable signal produced by the second sample of cells in step (c) in order to determine the infectivity of the viral particles; and
- e) contacting the viral particles of step (a) with a second sample of cells, wherein the second sample of cells express a cell surface receptor and/or co-receptor which binds to the virus;
- f) measuring the amount of detectable signal produced by the second sample of cells in step (e) in order to determine the infectivity of the viral particles; and
- g) comparing the amount of signal measured in step (d) with the amount of signal produced in step (f), wherein a decrease in the amount of signal with the antibody treated viral particles indicates that the patient has developed an antibody response capable of blocking virus infection.

62. (NEW) The method of claim 61, wherein steps (a)-(f) are repeated with varying concentrations of antibody preparations, and the amounts of signal generated for each of the concentrations are compared in step (g).

63. (NEW) The method of claim 62, further comprising generating a plot of viral infectivity based on antibody concentrations.
64. (NEW) The method of claim 63, further comprising generating an IC50 from the plot.
65. (NEW) The method of claim 61, wherein the indicator nucleic acid comprises an indicator gene.
66. (NEW) The method of claim 61, wherein the indicator gene is a luciferase gene.
67. (NEW) The method of claim 61, wherein the virus is HIV-1.
68. (NEW) The method of claim 61, wherein the receptor is CD4.
69. (NEW) The method of claim 61, wherein the co-receptor is CXCR4 or CCR5.
70. (NEW) The method of claim 69, wherein the co-receptor is CXCR4.
71. (NEW) The method of claim 69, wherein the co-receptor is CCR5.
72. (NEW) The method of claim 61, wherein the nucleic acids encoding envelope proteins comprise nucleic acids encoding the envelope polyprotein (gp160).
73. (NEW) The method of claim 61, wherein the nucleic acids encoding envelope proteins comprise nucleic acids encoding the surface envelope protein (gp120) and the transmembrane envelope protein (gp41).
74. (NEW) The method of claim 61, wherein the viral expression vector comprises an HIV nucleic acid.
75. (NEW) The method of claim 61, wherein the viral expression vector comprises an HIV gag-pol gene.

76. (NEW) The method of claim 61, wherein the first and/or second sample of cells are mammalian.
77. (NEW) The method of claim 76, wherein the mammalian cells are human.
78. (NEW) The method of claim 77, wherein the human cells are human embryonic kidney cells.
79. (NEW) The method of claim 78, wherein the human embryonic kidney cells are 293 cells.
80. (NEW) The method of claim 77, wherein the human cells are human T cells.
81. (NEW) The method of claim 77, wherein the human cells are peripheral blood mononuclear cells.
82. (NEW) The method of claim 61, wherein the first and/or second sample of cells are astrogloma cells.
83. (NEW) The method of claim 82, wherein the astrogloma cells are U87 cells.
84. (NEW) The method of claim 61, wherein the first and/or second sample of cells are human osteosarcoma cells.
85. (NEW) The method of claim 84, wherein the osteosarcoma cells are HT4 cells.
86. (NEW) The method of claim 61, wherein the antibody preparation binds to the receptor or co-receptor.
87. (NEW) The method of claim 86, wherein the antibody preparation binds the receptor CD4.
88. (NEW) The method of claim 86, wherein the antibody preparation binds the co-receptor CXCR4 or CCR5.

89. (NEW) The method of claim 88, wherein the antibody preparation binds the co-receptor CXCR4.
90. (NEW) The method of claim 88, wherein the antibody preparation binds the co-receptor CCR5.
91. (NEW) The method of claim 61, wherein the antibody preparation binds the viral envelope.